5.6 Data Acquisition (DA) Control Command

5.6.1 AD0 - Stop High-Speed (DA) Data Acquisition

Purpose: Aborts any currently operating DA process, controlled by any Setup Table.

Response: Confirmation/Error Packet (Section 5.12.1). See description below.

Format: AD0;

This command has no parameters. After it is executed, each DAU (that is acquiring data) is commanded to stop. First, a Confirmation (OK) Packet from the aborted command (e.g., AD1, AD2, AD3, or AD4) that started the acquisition run, is sent to the host computer (if not suppressed). The AD0 command then waits for each acquiring DAU to report that it stopped. If all successfully report, an AD0 Confirmation (OK) Packet is returned and the command has completed normally. However, if any acquiring DAU has not reported within 10 seconds, an AD0 Error Packet is returned. If an AD0 Error Packet is returned *immediately* (without the 10 sec. timeout) it indicates that no data acquisition was in progress when the AD0 command was issued.

Important: When the "ATRIG" Trigger Mode is used, data acquisition will not terminate until after the next scan is triggered.

5.6.2 AD1 - Acquire and Store Data

Purpose: Acquires data from all input units identified in the specified DA Setup Table. The SP stores the acquired data in SP memory, until the host issues an OD1 command to read the data, or issues an OD0 command to clear it. Enough SP memory must be available to receive the measurement sets.

Important: All initialization commands for each SDU, etc., must be completed first. Continuous data acquisition (MS = 0) is not allowed for this data acquisition mode.

Response: Confirmation/Error Packet (Section 5.12.1).

Format: AD1 stbl [nms];

stbl: chooses a particular DA Setup Table (1-4) that will govern data acquisition.